

**REMARKS**

Claims 1, 3, 5-11, and 13-18 are pending in this application. By this Amendment, claims 1, 11, 14, and 16-18 are amended. Reconsideration in view of the above amendments and following remarks is respectfully requested.

**I. The Claims Define Patentable Subject Matter**

The Office Action rejects claims 1, 3-11 and 13-14 under 35 U.S.C. §102(b) as anticipated by U.S. Patent No. 5,959,598 to McKnight. This rejection is respectfully traversed.

Applicants respectfully submit that McKnight does not teach, disclose or suggest a colored light generation unit that generates a plurality of colored lights at a predetermined frequency, and an image generation unit that processes the plurality of colored lights, so as to generate an image corresponding to each of the plurality of colored lights generated in a time sequence with the predetermined frequency being equal to or greater than 250 Hz so as to reduce or eliminate color breakup caused by high speed eye movement, as claimed in claim 1 and similarly claimed in claims 11 and 14. Further, McKnight does not teach or suggest that the color filter includes three colored lights and the predetermined frequency is controlled by the number of color filter rotations, as claimed in claims 16-18.

McKnight merely teaches that the frame rate begins at 180 Hz for a pattern of RGBRGB... (column 18, lines 16-22) and 6 analog subframes could be used (instead of 3) within the 1/60 second time period (column 18, lines 38-39). Accordingly, when six analog subframes RGBRGB are used, the color repetition frequency is 120 Hz. When 9 analog subframes RGBRGBRGB are used, the color repetition frequency is 180 Hz. Finally, when 12 analog subframes RGBRGBRGBRGB are used, the color repetition frequency is 240 Hz. Thus, McKnight discloses 6 analog subframes, 9, 12, etc.... However, the word "etc..." does not necessarily disclose 250 Hz or more. That is, it is not impossible to adopt 7 analog

subframes "RGBRGR, and GBRGRG,... (the color repetition frequency of 140 Hz), 10 analog subframes RGBRGRGR, GBRGRGRG,... (the color repetition frequency of 200 Hz),.... Accordingly, McKnight does not disclose that the color repetition frequency is 250 Hz or more for the colored light generation unit and image generation unit.

Additionally, McKnight solves color breakup by the moving images (column 18, lines 52-65) and does teach, disclose or even suggest the problem of color breakup by a saccade eye movement that the present invention solves. The problem of color breakup is caused by high speed eye movement (saccade eye movement) in still image. The present invention can solve the problem in still image. This is because, in the present invention, color repetition frequency is 250 Hz or more to solve color breakup by high speed eye movement.

However, McKnight cannot solve the problem in still image. Because McKnight only discloses increasing the subframe rate to solve color breakup by the moving images, McKnight can not have the necessity of increasing the subframe rate in still image. Making the frequency high requires a more complicated drive circuit. Thus, a personal skilled in the art would not try to make high frequency without a purpose.

McKnight discloses increasing the subframe rate to solve color breakup by the moving images. Further, McKnight discloses 6 analog subframes, 9, 12, etc... (the color repetition frequency, 120 Hz, 180 Hz, 240 Hz, etc....). McKnight only discloses the color repetition frequency is higher than ordinary display rate (frame frequency of 60 Hz). In other words, McKnight merely teaches or suggests the threshold value of the color repetition frequency is 60 Hz to solve color breakup by the moving images. The present invention discloses color breakup by the moving images can be reduced or eliminated in the color repetition frequency of 180-250 Hz just like McKnight. Further, the present invention discloses color breakup by high speed eye movement (in addition to color breakup by the moving images) can be reduced or eliminated in the color repetition frequency of 250 Hz or

more (page 13, lines 1-9 and page 17, line 11 - page 18, line 4). In other words, the threshold value of the color repetition frequency is 250 Hz to solve color breakup by a high speed eye movement. Accordingly, the present claim includes "equal to or greater than 250 Hz" and removes "less than 250 Hz", the present invention discloses the threshold value of color repetition frequency is 250 Hz to solve color breakup by the high speed eye movement. Also, McKnight does not disclose or suggest the problem of color breakup by high speed eye movement. Accordingly, McKnight does not disclose the threshold value of the color repetition frequency is 250 Hz.

For at least the reasons discussed above, there is no motivation to modify the teaching of McKnight to have the claimed frequency. That is, there is no advantage, and the Office Action has not asserted one, that would be obtained by modifying McKnight to have a predetermined frequency of 250 Hz or more.

With respect to claims 15-18, the applied art does not disclose a frequency of 250 Hz for the three colored lights. Instead, McKnight teaches a higher frequency when using 6, 9 or 12 analog subframes. Thus, there is no teaching or even suggestion for the colored lights to be 250 Hz or more. Nor is there any motivation to modify McKnight to provide this feature.

## **II. Conclusion**

In view of foregoing remarks, Applicants respectfully submit that claims 1, 3, 5-11, and 13-18 define patentable subject matter and the application is in condition for allowance. Favorable reconsideration is respectfully solicited.

Should the Examiner believe that anything further would be desirable in order to place this application in even better condition for allowance, the Examiner is invited to contact the undersigned at the telephone number listed below.

Respectfully submitted,



James A. Oliff  
Registration No. 27,075

Kevin M. McKinley  
Registration No. 43,794

JAO:KMM/jfb

Date: **October 29, 2003**

**OLIFF & BERRIDGE, PLC**  
**P.O. Box 19928**  
**Alexandria, Virginia 22320**  
**Telephone: (703) 836-6400**

<p>DEPOSIT ACCOUNT USE AUTHORIZATION Please grant any extension necessary for entry; Charge any fee due to our Deposit Account No. 15-0461</p>
--